

International Islamic University Chittagong

Department of Computer Science and Engineering

B.Sc. in Computer Science & Engineering

Mid-Term Examination (Spring 2024)

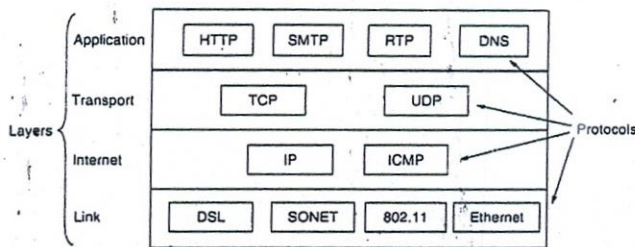
CSE-3633 (Computer Networks)

Time: 1:30 Hours

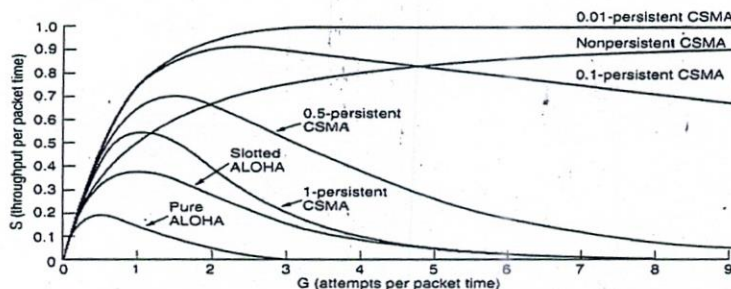
Full marks: 30

*[Figures in the right-hand margin indicate full marks.
Outcomes and Bloom's Levels are mentioned in additional Columns.]*

1. a) Write down the functions of Data link and Network layer. CO1 U 4
1. b) Based on the following figure, analyze the differences of this model with OSI model. CO2 An 6



2. a) Evaluate and explain the performance of the different medium access protocols from the given figure. CO3 E 5



- b) How does CSMA-CD improve performance over CSMA protocols? Why do you think Slotted Aloha has better performance than Pure Aloha? CO4 U 5

OR

2. b) Explain hidden terminal and exposed terminal problem. CO4 U 5
3. a) Explain the functions of any three fields of IPv4 or IPv6 packet header. Explain benefits of private IP addressing. CO1 U 5
3. b) Compare between allocations of IP address to a company using Classful IP addressing vs. VLSM. CO2 E 5

OR

3. b) With proper example, explain the concept of route aggregation. What are its benefits? CO2 E 5